

ABSTRACT OF THE DISCLOSURE

A method for making a dry plating built-up film  
5 comprises providing silicon carbide as a starting source  
and subjecting to dry plating while changing a  
concentration of a reactive gas continuously or  
intermittently to deposit and form, on a substrate, a thin  
film having different refractive indices along its  
10 thickness. A method for making a sputter built-up film is  
also described, which comprising providing silicon carbide  
as a target and subjecting to sputtering while changing  
making electric power against the target continuously or  
intermittently to deposit and form a thin film having  
15 different refractive indices along its thickness.